

# United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/040,398	12/28/2001	Kjetil Johannessen	42390P13377	2067
7590 07/28/2004			EXAMINER	
Charles K. Young BLAKELY, SOKOLOFF, TAYLOR & ZAFMAN LLP Seventh Floor			MOONEY, MICHAEL P	
			ART UNIT	PAPER NUMBER
12400 Wilshire Boulevard			2883	
Los Angeles, CA 90025-1026			DATE MAILED: 07/28/2004	

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)				
Office Action Commons	10/040,398	JOHANNESSEN, KJETIL				
Office Action Summary	Examiner	Art Unit				
	Michael P. Mooney	2877				
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).  Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).						
Status						
1) Responsive to communication(s) filed on 26 Ap	<u>oril 2004</u> .	•				
2a) This action is <b>FINAL</b> . 2b) ⊠ This	☐ This action is <b>FINAL</b> . 2b) ☐ This action is non-final.					
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is						
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims						
4)⊠ Claim(s) 16-27 is/are pending in the application	4)⊠ Claim(s) <u>16-27</u> is/are pending in the application.					
4a) Of the above claim(s) is/are withdraw	4a) Of the above claim(s) is/are withdrawn from consideration.					
5)⊠ Claim(s) <u>21-27</u> is/are allowed.						
6)⊠ Claim(s) <u>16 and 19</u> is/are rejected.	)⊠ Claim(s) <u>16 and 19</u> is/are rejected.					
7) Claim(s) <u>17,18 and 20</u> is/are objected to.						
8) Claim(s) are subject to restriction and/or election requirement.						
Application Papers						
9) The specification is objected to by the Examiner.						
10) ☐ The drawing(s) filed on is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.						
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11)☐ The oath or declaration is objected to by the Ex	aminer. Note the attached Office	Action or form PTO-152.				
Priority under 35 U.S.C. § 119		•				
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of:						
1. Certified copies of the priority documents have been received.						
2. Certified copies of the priority documents have been received in Application No						
3. Copies of the certified copies of the priority documents have been received in this National Stage						
application from the International Bureau (PCT Rule 17.2(a)).  * See the attached detailed Office action for a list of the certified copies not received.						
oco ine attached detailed Office action for a list of the certified copies not received.						
Attachment(s)						
1) Notice of References Cited (PTO-892)  4) Interview Summary (PTO-413)						
Notice of Draftsperson's Patent Drawing Review (PTO-948) Paper No(s)/Mail Date						
3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date	5)  Notice of Informal Page 1	atent Application (PTO-152)				
S. Patent and Trademark Office						

Application/Control Number: 10/040,398

Art Unit: 2877

#### **DETAILED ACTION**

#### Election/Restrictions

Applicant's election with traverse of claims 16-27 in the reply filed on 4/26/04 is acknowledged. No apparent grounds for traversal were given. This is not found persuasive because legitimate grounds for the restriction were offered and were not refuted.

The requirement is still deemed proper and is therefore made FINAL.

## Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

The factual inquiries set forth in *Graham* v. *John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

- 1. Determining the scope and contents of the prior art.
- 2. Ascertaining the differences between the prior art and the claims at issue.
- 3. Resolving the level of ordinary skill in the pertinent art.
- 4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

Claims 16, 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Yamashita et al. (20040012945) fig. 10 and further in view of Yamashita et al. (20040012945) fig. 8.

Yamashita et al. fig. 10 teaches a 1<sup>st</sup> waveguide (WG) in the bottom portion of the prism 16.

Although Yamashita et al. fig. 10 does not explicitly state prism 16 has a rounded top, it would have been obvious to do so because Yamashita et al. fig. 8 teaches the rounded top.

Yamashita et al. fig. 10 and Yamashita et al. fig. 8 are combined by taking the technology of Yamashita et al. fig. 10 which teaches a 1<sup>st</sup> waveguide in the bottom portion of the prism 16 and applying it to the rounded-top prism technology of Yamashita et al. fig. 8 to obtain the instant invention of a 1<sup>st</sup> WG in a bottom portion of a prism with a rounded top. It would have been obvious to one of ordinary skill in the art at the time the invention was made to make such a combination for the purpose of providing better power transmission.

The reciprocal nature of the optical component of the Yamashita et al. fig. 10 & fig. 8 combination inherently provides that that the rounded top has the capability to focus light entering the prism into the 1st WG.

Thus claim 16 is rejected.

Yamashita et al. combination device provides the inherent capability for light entering the rounded top to be redirected approximately 90 degrees by the prism and the first waveguide. Thus claim 19 is rejected.

## Allowable Subject Matter

Claims 21-27 are allowed.

Application/Control Number: 10/040,398

Art Unit: 2877

The prior art, either alone or in combination, does not disclose or render obvious a method of making an optical probe, the method comprising: forming a lens surface on a prism; and forming a waveguide in a bottom portion of the prism in combination with the rest of claim 21.

Claims 17,18, 20 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The prior art, either alone or in combination, does not disclose or render obvious wherein the prism is at least partially made of sapphire, high density glass, LiNbO.sub.3, or rutile in combination with the rest of claim 17.

The prior art, either alone or in combination, does not disclose or render obvious a second waveguide in the bottom portion of the prism, wherein the rounded top constitutes more than one focus to couple light into the first waveguide and the second waveguide in combination with the rest of claim 18.

The prior art, either alone or in combination, does not disclose or render obvious wherein the rounded top comprises a microlens array in combination with the rest of claim 20.

### Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Michael P. Mooney whose telephone number is 571-272-2422. The examiner can normally be reached during weekdays, M-F.

Art Unit: 2877

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Frank G. Font can be reached on 571-272-2415. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is

571-272-1562.

Michael P. Mooney

Examiner Art Unit 2877 Frank G. Font Supervisory Patent Examiner

had I F

Art Unit 2877

FGF/mpm 7/24/04